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## Description of Four New Species of *Bulbophyllum* (Orchidaceae) from Madagascar

Gunter A. Fischer,<sup>1\*</sup> Anton Sieder,<sup>1</sup> Johan Hermans,<sup>2</sup> Jacky Andriantiana,<sup>3</sup> Michael Kiehn,<sup>4</sup>  
and Phillip J. Cribb<sup>2</sup>

<sup>1</sup>Department of Organismic Biology/Ecology and Diversity of Plants,  
University of Salzburg, Hellbrunnerstrasse 34, 5020 Salzburg,  
Austria. \*Author for correspondence: gunter.fischer@sbg.ac.at

<sup>2</sup>Royal Botanic Gardens, Kew, Richmond, Surrey, TW93AB, United Kingdom

<sup>3</sup>Parc Botanique et Zoologique de Tsimbazaza (PBZT), Rue Fernand Kasanga,  
Tsimbazaza, Antananarivo 101, Madagascar

<sup>4</sup>Department of Biogeography and Botanical Garden, University of Vienna,  
Rennweg 14, 1030 Vienna, Austria

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**ABSTRACT.** Four new orchid species from Madagascar are described and illustrated. Notes on the distribution, ecology, and conservation status are provided. *Bulbophyllum uroplatoides* Hermans & G. A. Fischer, *B. histrionicum* Reichenbach f. ex G. A. Fischer & P. J. Cribb, and *B. senghasii* G. A. Fischer & Sieder belong to section *Calamaria* Schlechter, whereas *B. bryophytoides* G. A. Fischer & Andriantiana belongs to section *Lichenophylax* Schlechter. *Bulbophyllum uroplatoides* Hermans & G. A. Fischer is related to *B. cardiobulbum* Bosser, but differs in the thickened racemes, overall plant size, the shape of the sepals, petals, and lip, and coloration. *Bulbophyllum histrionicum* Reichenbach f. ex G. A. Fischer & P. J. Cribb was previously recognized by Reichenbach as a new species, but was never formally described. It is characterized by its large, orbicular to somewhat ovoid pseudobulbs that are green flushed with red, large, ovate-oblong to ovate-lanceolate leaves, red floral bracts, long sepals, narrowly triangular petals, and glabrous lip. *Bulbophyllum senghasii* G. A. Fischer & Sieder has orbicular, non-compressed bifoliate pseudobulbs, flowers with greenish yellow sepals that are spotted with dark brown on the outside, and an elliptic lip that is not compressed in the middle and has erose rather than long-ciliate margins and falcate rather than straight stelia. *Bulbophyllum bryophytoides* G. A. Fischer & Andriantiana is a very tiny plant distinguishable from other species of section *Lichenophylax* by its densely long-ciliate petals and its ciliate lip that lacks a median callus and has a glabrous surface.

**RÉSUMÉ.** Quatre nouvelles espèces d'orchidée de Madagascar sont décrites et illustrées. Notes sur la distribution, écologie et sur le statut de conservation

sont fournis. *Bulbophyllum uroplatoides* Hermans & G. A. Fischer, *B. histrionicum* Reichenbach f. ex G. A. Fischer & P. J. Cribb, et *B. senghasii* G. A. Fischer & Sieder appartiennent à la section *Calamaria* Schlechter tandis que *B. bryophytoides* G. A. Fischer & Andriantiana appartient à la section *Lichenophylax* Schlechter. *Bulbophyllum uroplatoides* Hermans & G. A. Fischer est étroitement apparenté au *B. cardiobulbum* Bosser, mais le port de la plante, le modèle, la coloration des sépales et pétales ainsi que la grappe épaisse les différencie. *Bulbophyllum histrionicum* Reichenbach f. ex G. A. Fischer & P. J. Cribb préalablement reconnu par Reichenbach comme nouvelle espèce mais jamais décrite ni publiée formellement. Il est bien caractérisé par des pseudobulbes larges, sphériques un peu ovoïdes, feuilles ovales-oblongs à ovales-lancéolées, larges de couleur verte empourprée, bractée florale rouge, sépales longues, pétales étroitement triangulaires et labelle glabre. *Bulbophyllum senghasii* G. A. Fischer & Sieder a des pseudobulbes bifoliés, non comprimés, sphériques (orbiculaires), fleurs à sépales jaunes verdâtres, tachetées brunies vers l'extérieur, labelle elliptique non-comprimé au milieu à bordure plutôt rongée que longuement ciliée, stélie plutôt falciforme que rectiligne. *Bulbophyllum bryophytoides* G. A. Fischer & Andriantiana est une plante très petite, distinguable facilement des autres espèces de la section *Lichenophylax* par ses pétales densément long-ciliés et labelle cilié sans callus médian et à surface glabre.

**Key words:** *Bulbophyllum*, IUCN Red List, Madagascar, Orchidaceae.

The first taxonomic treatment of *Bulbophyllum* Thouars for Madagascar and the Mascarenes was

completed at the beginning of the 19th century (Thouars, 1822), and Thouars described 16 species of *Bulbophyllum* including *B. nutans* Thouars, the type species of the genus. Cordemoy (1893) later listed 15 species for La Réunion. Schlechter (1924) described 117 species of *Bulbophyllum* for Madagascar in his work *Orchidaceae Perrieranae*, which he attributed to 19 sections. His classification is, with some adaptations, still used today.

A milestone for the knowledge of the orchids of Madagascar was the publication of Perrier de la Bâthie (1939). In his comprehensive account (still forming the basis for all taxonomic treatments up to the present), he described in detail 179 species of *Bulbophyllum* for Madagascar. During the past four decades, Bosser and collaborators (Bosser, 1965, 1969, 1971, 1989, 2000, 2004; Bosser & Cribb, 2001) published several papers on Malagasy *Bulbophyllum*, including sectional treatments and new descriptions. Currently, some 211 species names (including several varieties) are accepted for Madagascar and the Mascarenes; 26 species names are unclear and in need of revision. Checklists of the orchids of Madagascar have been published by Du Puy et al. (1999) and Hermans et al. (2007). Recently, the number of sections was extended to 20 (Fischer et al., 2007a).

During the past four years, the genus *Bulbophyllum* in Madagascar was intensively investigated using phylogenetic and molecular methods (Fischer et al., 2007b). Several botanical surveys were undertaken in various parts of Madagascar. During this work, three new species belonging to section *Calamaria* Schlechter and one new species belonging to section *Lichenophylax* Schlechter were discovered and are described here. Notes on their distribution, ecology, and conservation are provided.

### I. *Bulbophyllum* sect. *Lichenophylax* Schlechter.

Section *Lichenophylax* was established by Schlechter (1924) for a group of unique species endemic to the humid forests of eastern Madagascar. All species are tiny creeping plants clearly characterized by a ramified rhizome, ovoid to oblong bifoliate pseudobulbs, and a setaceous and uniflorous inflorescence.

#### 1. *Bulbophyllum bryophytoides* G. A. Fischer & Andriantiana, sp. nov. TYPE: Madagascar. Toamasina: Distr. Maroantsetra, Sahantaha, Mt. Anjanaharibe, 800 m, 15°10'56"S, 49°37'17"E, very local, 19 Nov. 2005, G. A. Fischer & Andriantiana FS2595 (holotype, WU). Figure 1.

Affine *Bulbophyllo lichenophylaci* Schlechter et *B. afzelii* Schlechter sed petalis dense longiciliatis, labello ciliato

ecalloso glabro et sepalis 6–8 mm longis (9–10 mm longis in *B. afzelii*; 10–12 mm longis in *B. lichenophylaci*) satis differt.

Rhizome 0.6–1 mm diam., nodes slightly swollen; roots 0.25–0.35 mm diam.; rhizome sheaths tubular, membranous, covering the new growth and bulb bases, disintegrating when old; pseudobulbs green, bifoliate, orbicular to elliptic, 2–3 × 1.3–1.6 mm, 5–7 mm apart. Leaves green, elliptic, acute, ca. 6 × 3.5 mm, tip acuminate, thin and very soft. Inflorescence 20–30 mm, single-flowered; peduncle erect, not swollen, setaceous, with 2 to 3 sheaths, ending in 1 terminal flower; peduncle sheaths tubular, 2–3 mm, caudate, membranous; floral bracts triangular, ca. 2 mm, membranous, slightly keeled, tip acuminate, base broadly attached. Flower resupinate, apically drooping from the pedicel and peduncle; pedicel and ovary 0.5–0.6 mm, subulate; sepals purple; dorsal sepal oblong-ovate to oblong, 6–7 × 1.5–2 mm, tip caudate, margins finely ciliate, 3-nerved, surface glabrous; lateral sepals free, 3-nerved, slightly recurved toward the tips, 7–8 × 3–3.5 mm, tips caudate, margins entire to very finely ciliate toward the base, base broadly attached; petals blackish purple with a whitish cream base, ovate, 5–5.2 × 2–2.3 mm, margins densely whitish long-ciliate, 1-nerved, surface finely papillose; lip blackish purple, recurved, elliptic to ovate-oblong in outline, tip rounded, margins over the entire length with seam-like lateral lobes that are densely ciliate, set apart from the median part of the lip by 2 ridges that alternate toward the tip, the median part with a very small slit continuing for 1/4 of the lip, surface glabrous; column white, from the base of the free part up to the tip of the stielidia 1.7–2 mm, with distinct, very short, truncate stielidia; column not winged, with a basal distinct tooth at its median margins; anther ca. 0.5 × 0.5 mm, with a median ridge, surface finely and slightly rugose; anther white; pollinia 4.

*Distribution and habitat.* The new species is only known from the type collection in wet montane forest between 600 and 1000 m in rather shady places at the base of trunks on Mount Anjanaharibe, northwest of Maroantsetra.

*IUCN Red List category.* The species seems to be very rare and restricted in distribution; it must be considered as Endangered (EN) following the IUCN (2001) criteria.

*Etymology.* The habit of the plant without flowers resembles the mat-like growth form of moss, and therefore this species is named *Bulbophyllum bryophytoides*.

*Taxonomic relationships.* This species is unique within section *Lichenophylax* because of the densely

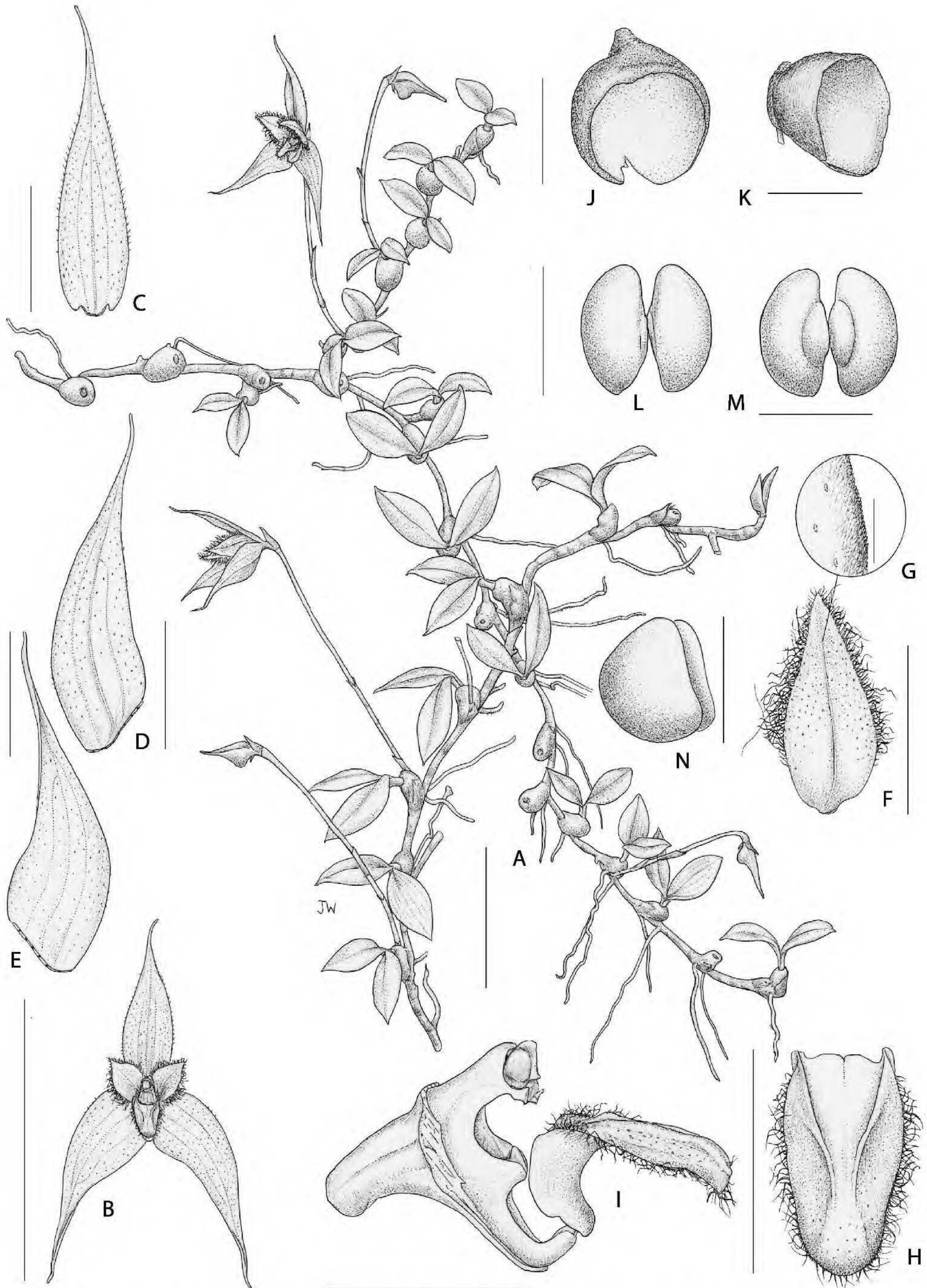


Figure 1. *Bulbophyllum bryophytoides* G. A. Fischer & Andriantiana. —A. Habit. —B. Flower, frontal view. —C. Dorsal sepal. —D. Lateral sepal, abaxial view. —E. Lateral sepal, adaxial view. —F. Petal, abaxial view. —G. Petal, detail of surface structure of central ridge, abaxial view. —H. Labellum, top view. —I. Column with labellum, side view. —J. Anther cap, front view. —K. Anther cap, side view. —L. Pollinia, back view. —M. Pollinia, front view. —N. Pollinia, side view. Drawn from the holotype G. A. Fischer & Andriantiana FS2595 (WU) by Juliet Beentje. Scale bars: A, B = 1 cm; C–F = 3 mm; G, I = 2 mm; H–N = 0.3 mm.

long-ciliate petals and the ciliate, glabrous lip without a median callus.

## II. *Bulbophyllum* sect. *Calamaria* Schlechter.

Schlechter (1924) first used the name *Calamaria* for a group of orchids that occur in Madagascar, the Comoros, the Mascarenes, and Africa. Section *Calamaria* is characterized by ovoid to orbicular, sometimes flattened, unifoliate or bifoliate pseudobulbs. The inflorescence is a many-flowered raceme with a rachis as thick as the peduncle or swollen, with the flowers inserted into dimples. The floral bracts cover the whole flower or at least the pedicel and ovary of the flowers, which are arranged in rows or spirally. The sepals are glabrous or verrucate, rarely fine hairy, with always entire margins. The lateral sepals are free. The lip is thick, recurved in the middle, with glabrous to long hairy margins. The stelidia are linear, falcate or recurved, and acute to acuminate. The anther has a protrusion that is often as long or longer than the stelidia. All species are adapted to drought through succulent vegetative parts.

### 2. *Bulbophyllum histrionicum* Reichenbach f. ex G. A. Fischer & P. J. Cribb, sp. nov. TYPE: Madagascar. Diego-Suarez/Antsiranana: Sous-préfecture de Vohemar, commune rurale de Daraina, forêt d'Antsahabe, 310 m, 13°10'37"S, 49°33'15"E, formation végétale humide de basse altitude le long d'un cours d'eau, substrat assez rocailleux, 30 Apr. 2004, P. Ranirison 733 (holotype, G; isotype, WU). Figure 2.

Affine *Bulbophyllo pervillei* Rolfe sed pseudobulbis viridibus rubro-suffusis orbicularibus vel ovoideis, 2–3 × 1.8–2.7 cm, foliis ovato-oblongis vel oblongo-lanceolatis, 3–4 cm longis, inflorescentia usque ad 35-flora, bracteis rubris, ca. 4 mm longis, sepalis ca. 7 mm longis, petalis anguste triangularibus et labello glabro satis differt.

Rhizome 2–3 mm diam., nodes not swollen, roots 0.4–0.7 mm diam.; rhizome sheaths tubular, covering the base of the pseudobulbs and the new growth, disintegrating when old; pseudobulbs green suffused with red, bifoliate, orbicular to slightly ovoid, 1–2 mm apart at maximum, often touching each other or imbricate, arranged like in a mosaic, flattened, 2–3 × 1.8–2.7 cm, not angled. Leaves green yellowish sometimes suffused with red, ovate-oblong to oblong-lanceolate, 3–4 × 1–1.2 cm, tip obtuse to slightly oblique, very thick, coriaceous. Inflorescence 20–30 cm, up to 35 flowers; peduncle arising horizontally, red, not swollen, 8–12 cm long, 1 mm diam., with 4 to 5 sheaths; peduncle sheaths tubular, ca. 1 cm, tip

acute, membranous, with nerves, glabrous; rachis red, pendulous, swollen at the nodes, subulate, 12–18 cm, glabrous to fine granulate; floral bracts red, triangular, ca. 4 × 1 mm, tip acute, base broadly attached, membranous, glabrous; flowers spiraling in a rather lax raceme, many flowers open simultaneously; pedicel and ovary glabrous, ca. 2.5 mm, jugae ending in a short tooth. Dorsal sepal fire red, ovate-lanceolate, ca. 7 × 2 mm, 1-nerved, tip caudate, margins entire, glabrous, base broadly attached, slightly keeled, concave (cap-like) hiding the top part of the column; lateral sepals fire red, free, narrowly triangular with a broad base, ca. 7 × 3.5 mm, 1-nerved, tip caudate, margins entire, glabrous, base broadly attached; petals white with red margins, not recurved, slightly falcate and narrowly triangular, 1-nerved, margins entire, glabrous, thin, base broadly attached; lip fire red, recurved, fleshy, glabrous, not ciliate, abaxially with a median furrow; column white with some red spots, 2–3 mm from the base of the free part up to the tip of the stelids, with rather short broad, triangular stelids, slightly winged below the base of the stelids; anther ca. 0.7 × 0.7 mm, papillose; pollinia 4, the inner 2 very small.

*Distribution and habitat.* *Bulbophyllum histrionicum* is endemic to northern Madagascar in dry to subhumid lowland forests, between 100 and 350 m, including the Tsingys of Ankarana.

*IUCN Red List category.* This species seems to be very rare and restricted in distribution; it must be considered as Endangered (EN) following the IUCN (2001) criteria.

*Etymology.* The reason Reichenbach chose the epithet formed from the Latin "histrionia," meaning "the art of acting" or "dramatic," is not known, but it probably refers to the showy habit of this species.

*Notes.* Reichenbach considered publishing *Bulbophyllum histrionicum*, as noted on the label of material examined by him (Herb. Mus. Palat. Vindob. Reichenbach: Herb Orchid. No. 9655), but never published a valid description. We therefore name this species *B. histrionicum* as proposed by Reichenbach.

*Taxonomic relationships.* *Bulbophyllum histrionicum* is related to *B. pervillei*, which only occurs in eastern humid coastal forests. The elliptic leaves, the laxly flowered inflorescence, the yellowish ovate-oblong sepals with an acuminate tip, the ovate-oblong petals, and the strongly papillose lip distinguish *B. pervillei* from *B. histrionicum*.

*Paratypes.* MADAGASCAR. **Antsiranana:** Daraina, Bekramosy, 13°14'17"S, 49°37'24"E, 27 Oct.

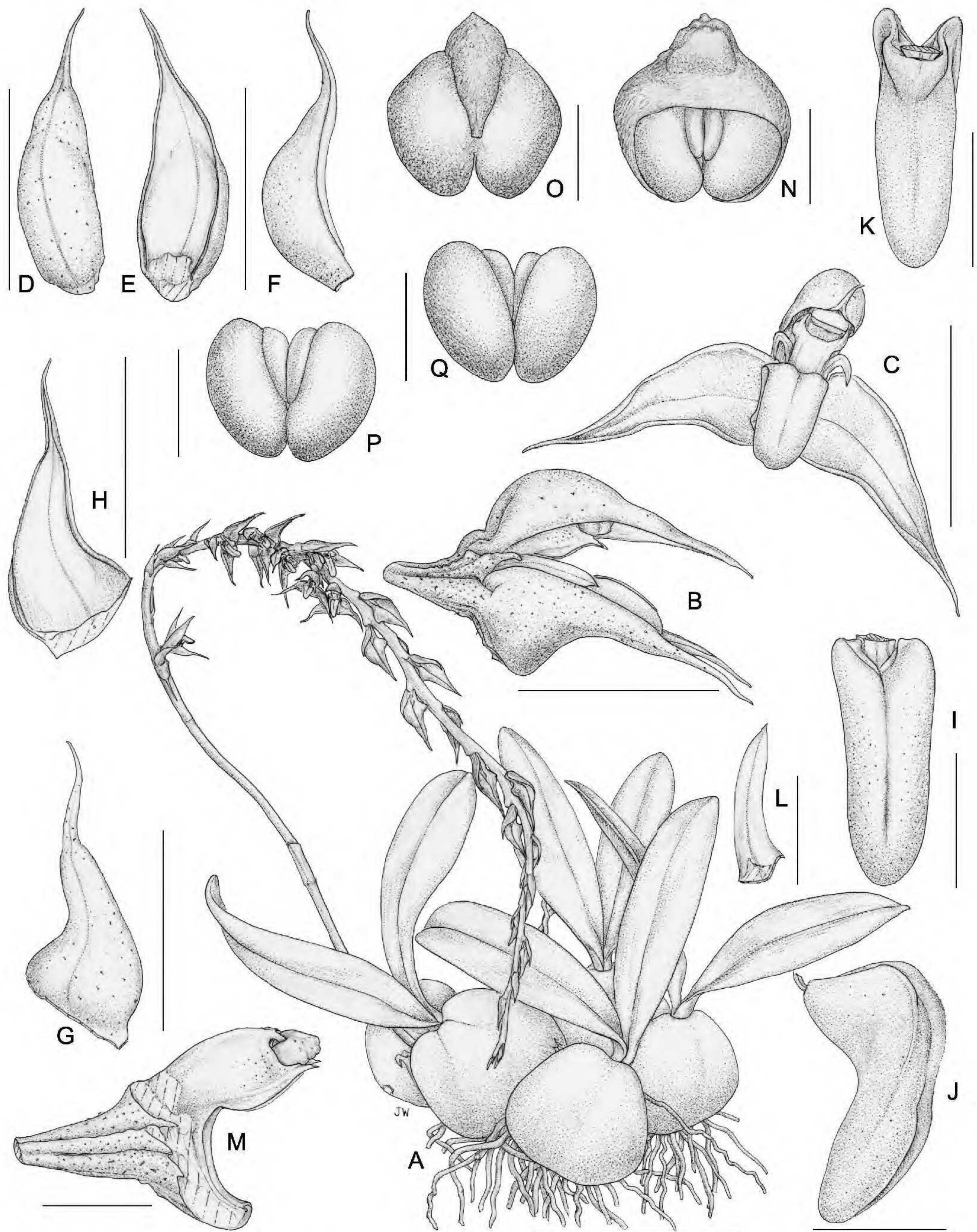


Figure 2. *Bulbophyllum histrionicum* Reichenbach f. ex G. A. Fischer & P. J. Cribb. —A. Habit. —B. Flower, side view. —C. Flower, frontal view. —D. Dorsal sepal, abaxial view. —E. Dorsal sepal, adaxial view. —F. Dorsal sepal, side view. —G. Lateral sepal, abaxial view. —H. Lateral sepal, adaxial view. —I. Labellum, front view. —J. Labellum, side view. —K. Labellum, back view. —L. Petal. —M. Column, side view. —N. Anther cap, front view. —O. Anther cap, back view. —P. Pollinia, front view. —Q. Pollinia, back view. Drawn from the holotype *P. Ranirison* 733 (G) by Juliet Beentje. Scale bars: A = 3 cm; B–H = 5 mm; I–M = 2 mm; N–Q = 0.5 mm.

2004, *Fischer et al. FSI232* (WU); Daraina, 13°13'S, 49°34'30"E, 28 Oct. 2004, *Fischer et al. FSI295* (WU); Anivorano du Nord, 12°44'S, 49°13'E, 17 Apr. 1970, *J. Bosser 20220* (P 323161); massif calcaire de l'Ankarana, 12°55'S, 49°6'E, 10 Mar. 1990, *M. Bardot-Vaucoulon 145* (P 323188); Tsingy du Lac-Vert, Massif de l'Ankarana, 12°55'S, 49°6'E, 23 Mar. 1991, *M. Bardot-Vaucoulon 463* (P 323189); s. loc., Herb. Mus. Palat. Vindob. Reichenbach: Herb. Orchid. No. 9655 (W).

**3. *Bulbophyllum senghasii*** G. A. Fischer & Sieder, sp. nov. TYPE: Madagascar. 100 mi. S of Antananarivo, in forest reserve, very local, fl. in cult., 30 Oct. 1961, *Mason 78* (holotype, K 14850). Figure 3.

Affine *Bulbophyllo sambiranensi* Jumelle & H. Perrier sed pseudobulbis orbicularibus non-compressis, foliis ellipticis 2.5–3.5 × 1.5–2 cm, floribus flavoviridibus atrobrunneomaculatis, labello flavo in medio non-compresso margine eroso et stelidiis falcatis satis differt.

Rhizome ca. 2 mm diam., nodes not swollen, roots 0.4–0.6 mm diam.; rhizome sheaths tubular, membranous, covering the base of the pseudobulbs, disintegrating when old; pseudobulbs green, bifoliate, orbicular, 1.5–2 × 1.5–2 cm, 0.5–1 cm apart, not flattened, not angled. Leaves green, elliptic, obtuse, 2.5–3.5 × 1.5–2 cm, tip retuse, coriaceous, very thick. Inflorescence 10–15 cm, up to 30 flowers; peduncle erect, swollen toward the rachis, apical drooping and torsion of the apex, with 5 to 6 sheaths; peduncle sheaths tubular, 5–6 mm, keeled, rounded to truncate, membranous with nerves; rachis swollen, spindle-shaped, 5–7 cm, 4 mm diam., subulate, with fine rugosities; floral bracts recurved, ovate, ca. 6 × 2 mm, membranous, central nerve keeled, with fine rugosities, tip acute, base broadly attached; flowers placed in 3 rows, in a rather dense raceme with dimples, giving a deltoid and imbricate impression at the apex where the floral bracts cover the flower buds, many flowers opening simultaneously; pedicel and ovary ca. 1 mm long, covered with fine rugosities; jugae ending in short acute tooth; sepals yellow adaxially, greenish yellow abaxially with some dark brown spots; dorsal sepal not recurved, ca. 4.5 × 1.5 mm, narrowly elliptic to oblong, concave, cap-like, suffused with small rugosities, margins entire, thick, base broadly attached, tip acute to acuminate; lateral sepals free, slightly recurved, falcate, ca. 3.5 × 2 mm, suffused with small rugosities, margins entire, base broadly attached, tips acuminate; petals white, linear acute, ca. 2 × 0.5 mm, margins entire, glabrous, base broadly attached; lip dark yellow, recurved, elliptic in

outline, median part not compressed, ca. 2.5 × 1.3 mm, tip very thick, truncate, margins with a narrow seam with edges that are erose, surface glabrous, lateral sides finely papillose, abaxially with a central furrow; column white, ca. 2 mm long from the base of the free part up to the tip of the stelids, winged below the base of the stelids; stelids acute to acuminate, falcate, ca. 0.5 mm; anther ca. 0.5 × 0.6 mm, yellow, with a warty and papillose filament; pollinia 4.

*Distribution and habitat.* The distribution of *Bulbophyllum senghasii* is unknown because the species is known only from the type collection.

*IUCN Red List category.* The species seems to be very rare and restricted in distribution; it must be considered as Endangered (EN) following the IUCN (2001) criteria.

*Etymology.* The species is named in honor of the late Karlheinz Senghas, the former curator of the Heidelberg Botanic Garden, who collected the paratype on one of his trips to Madagascar together with Werner Rauh.

*Taxonomic relationships.* *Bulbophyllum sambiranense* Jumelle & H. Perrier, which is closely related to *B. senghasii*, is clearly distinguishable by the compressed pseudobulbs and the ciliate margins of the lip.

*Paratype.* MADAGASCAR. *K. Senghas & W. Rauh s.n.*, cult. HBV 099B60-1 (WU).

**4. *Bulbophyllum uroplatoides*** Hermans & G. A. Fischer, sp. nov. TYPE: Madagascar. Antsirana: Edge of Anjanaharibe reserve, near Andranotsarabe, in dense forest, 1050 m, Nov. 1994, *J. Hermans 3400* (holotype, K). Figure 4.

Affine *Bulbophyllo cardiobulbo* Bosser sed pseudobulbis 2–3.5 cm diam., inflorescentia laxe 15- ad 18-flora, sepalis lanceolatis vel lineari-lanceolatis 7–8 mm longis casteneis, petalis cremeis rubro-marginatis et labello ca. 6 mm longo carmineo ad basin cremeo ad margines verrucoso et columna alba ad basin rubroguttata satis differt.

Rhizomes 4–5 mm diam., completely hidden by the pseudobulbs; roots 0.5–1 mm diam., wiry, glabrous; rhizome sheaths membranous; pseudobulbs pale green-yellow, becoming yellow with age, bifoliate, ovate to orbicular, with sharp edges, very strongly flattened, 2–3.5 cm diam., partly covering each other. Leaves pale green, oblong to ligulate, base very shortly petiolate, 2–4.5 × 1–2 cm, tip oblique, midrib obscure. Inflorescence up to 22 cm long, laxly 15- to 18-flowered, semi-erect; peduncle 13–15 × 0.2–0.3 cm, emerging from behind the pseudobulbs where the base is covered by a triangular sheath, slightly

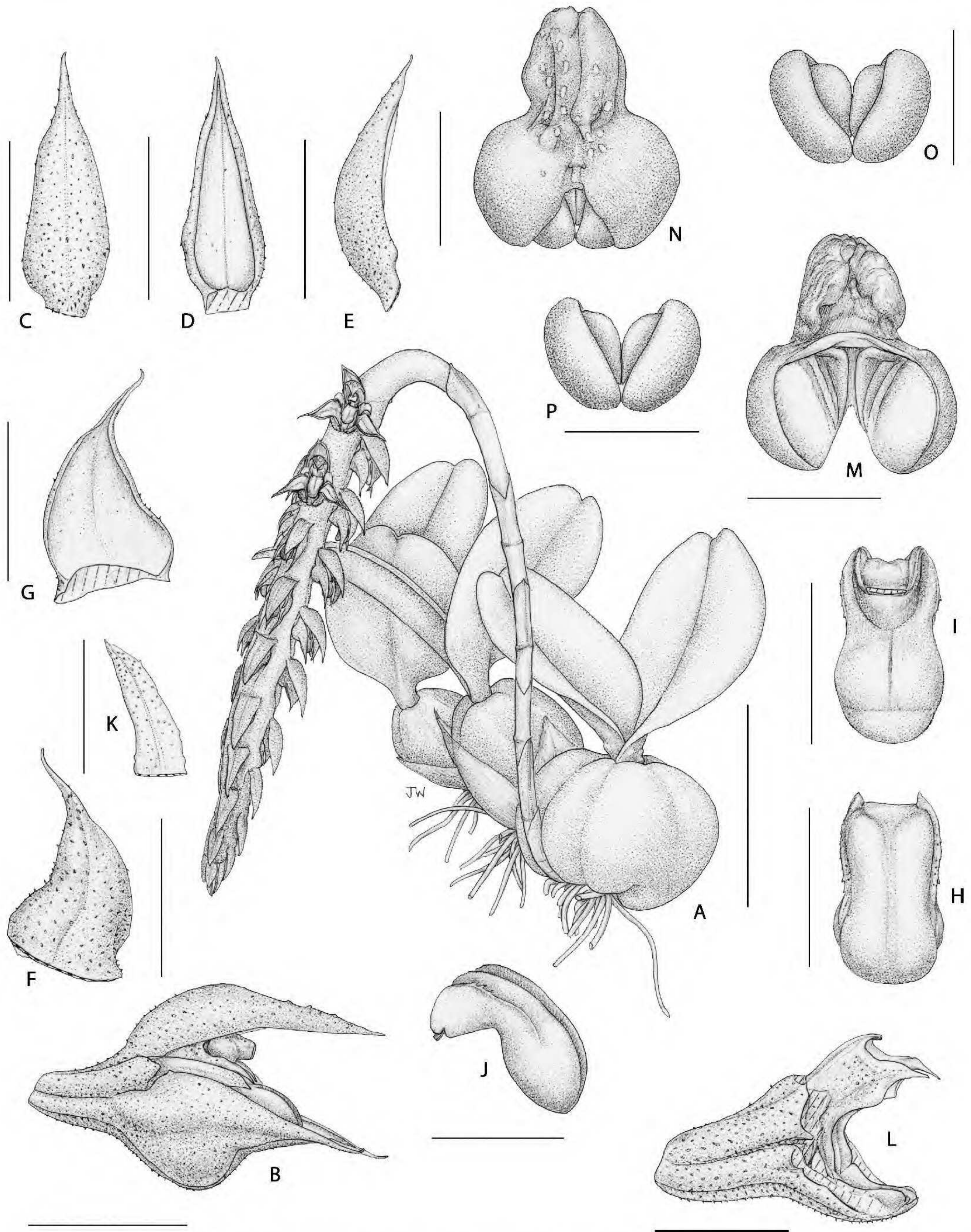


Figure 3. *Bulbophyllum senghasii* G. A. Fischer & Sieder. —A. Habit. —B. Flower, side view. —C. Dorsal sepal, abaxial view. —D. Dorsal sepal, adaxial view. —E. Dorsal sepal, side view. —F. Lateral sepal, abaxial view. —G. Lateral sepal, adaxial view. —H. Labellum, front view. —I. Labellum, back view. —J. Labellum, side view. —K. Petal. —L. Column, side view. —M. Anther cap, front view. —N. Anther cap, back view. —O. Pollinia, front view. —P. Pollinia, back view. Drawn from the holotype *Mason 78* (K) by Juliet Beentje. Scale bars: A = 2 cm; B–G = 3 mm; H–L = 2 mm; M–P = 0.5 mm.

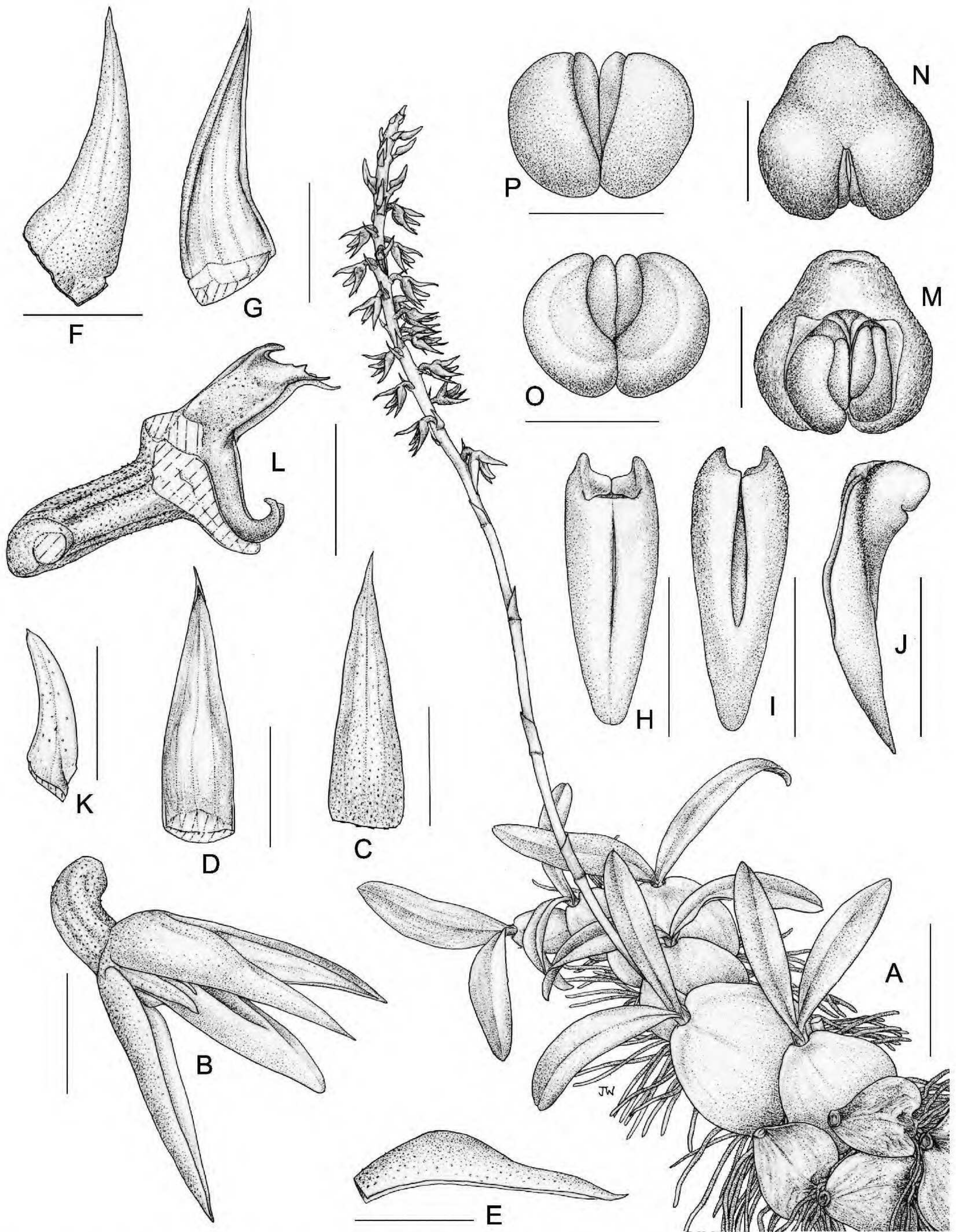


Figure 4. *Bulbophyllum uroplatoides* Hermans & G. A. Fischer. —A. Habit. —B. Flower. —C. Column, abaxial view. —D. Dorsal sepal, adaxial view. —E. Dorsal sepal, side view. —F. Lateral sepal, abaxial view. —G. Lateral sepal, adaxial view. —H. Labellum, back view. —I. Labellum, front view. —J. Labellum, side view. —K. Petal, abaxial view. —L. Column, side view. —M. Anther cap, front view. —N. Anther cap, back view. —O. Pollinia, front view. —P. Pollinia, back view. Drawn from the holotype *Hermans 3400* (K) by Juliet Beentje. Scale bars: A = 3 cm; B–J = 3 mm; K, L = 2 mm; M–P = 0.5 mm.



compressed, brownish red, with 3 or 4 sheaths; peduncle sheaths tubular, 3–8 mm, membranous; rachis brownish red, 8–9 × 0.3–0.4 cm, surface slightly ridged and hollowed at the inset of the ovary; floral bracts 4–10 mm apart, lanceolate, acute, 4–6 mm long. Flowers ca. 8 × 8 mm, all approximately facing the same direction, in a lax raceme, mostly opening simultaneously; pedicel and ovary 2–3 × ca. 1.5 mm, subsessile, not resupinate; sepals chestnut with darker longitudinal marking; dorsal sepal not recurved, linear-lanceolate, 7–8 × 2–2.5 mm, base concave, tip acute, margins entire, glabrous; lateral sepals lanceolate, ca. 8 × 4 mm, concave, forming a ca. 2 mm mentum, tips acute; petals cream with red margins thin, narrowly triangular, ca. 2 × 0.75 mm, tip acute, margins entire; lip ca. 6 × 1.5 mm, crimson, cream at the base, articulate and mobile on the column foot, base recurved with a central fissure ca. 4 mm long from the base, glabrous but margins microscopically verrucose; column whitish yellow, foot spotted with red, ca. 1.5 mm from the base of the free part to the tips of the stelids, stelids slightly spreading, ca. 0.5 mm, with small rounded lobe along the upper margin; anther 0.9–1 mm diam., minutely verrucose; pollinia ca. 0.5 mm diam.

*Distribution and habitat.* *Bulbophyllum uroplatooides* is endemic to northern Madagascar in montane humid forests and has been collected from 1050 m altitude.

*IUCN Red List category.* The species is very rare and restricted in distribution; it must be considered as Endangered (EN) following the IUCN (2001) criteria.

*Etymology.* The species epithet refers to the leaf-tailed geckos (*Uroplatus* Duméril) of Madagascar, which are also found flattened against trees.

*Taxonomic relationships.* *Bulbophyllum cardiobulbum*, the closest relative of *B. uroplatooides*, differs in its very narrowly triangular sepals and petals and the very papillose and elongated lip that is compressed in the median part. The vegetative parts of both species are very similar but can be distinguished because those of *B. cardiobulbum* are larger in all parts.

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